

Scope of Claim

- 1) The Precision Desorbing (detachable) Metal Sheet Bend Angle Adjustment Device operates with the lifter plate with a tapered face on the bottom, the wedge plate with a reverse tapered face on top and a side recess cavity, the support plate with a guide groove (slot) on top and the upper positioning frame with the rotary dial furnished with an adjustment screw. This assembly is housed by the securing the support plate to the lower positioning frame. The support plate with the guiding groove (slot) enables the wedge plate to smoothly glide atop the support plate. The adjustment screw of the rotary dial fits into the recess cavity of the wedge plate, on which the lifter plate, secured inside the upper positioning frame, sits. The upper positioning frame ensure the vertical movement of the lifter plate, which is pushed up or down by the “back and forth” gliding movement of the wedge plate. Rotation of the rotary dial cause the rotation of the adjustment screw, which in turn moves the wedge plate in its back and forth gliding movement, which in turn moves the lifter plate up or down. The lifter plate ultimately lifts up or lowers down the die of the metal sheet bending equipment to which this Precision Desorbing (detachable) Metal Sheet Bend Angle Adjustment Device is mounted.
- 2) The Precision Desorbing (detachable) Metal Sheet Bend Angle Adjustment Device also reduces the stress on the die of the metal sheet bending equipment by furnishing a ring spring inside the through hole with a mid way chamber, bored through the lifter plate. The bolt secures the ring spring, which goes through the lifter to the threaded recess of the support plate.
- 3) The Precision Desorbing (detachable) Metal Sheet Bend Angle Adjustment Device utilize the guiding groove (slot) atop the support plate to ensure the smooth “back and forth” gliding movement of the wedge plate.